Search Research and Media Search

- <u>Sign Up</u>
- Sign In

Research and Media Network

Bringing people together to improve communication of research findings

- Main
- My Page
- Members
- Photos
- Videos
- Forum
- Groups
- Blogs
- All Blog Posts
- My Blog
- Add



Indian Herbs and Herbal Formulations can protect from Excess Alcohol

- Posted by Pankaj Oudhia on July 8, 2012 at 15:57
- View Blog

Excerpts from my Jungle Diaries (April 2012 onwards) Part-8

(In continuation of Part-7)

"Don't give rest to your mouth, continue taking wild tubers specially Van Jagmandal Kanda. It is good for health and after end of this visit I will tell you the big secret about it." I was with the senior Traditional Healer of Gariaband during rainy season.

The forest was flooded and with the help of rocks and tree branches we were crossing it in day time. We were seeing the venomous creatures but fortunately it seemed that they were not interested in us. With fear my mouth was drying. I was trying to cross the Forest as soon as possible because we were far from the first aid unit and in case of any emergency no help was there atleast up to 8-9 hours. My first aid kit, driver and assistants were also not with me. They were waiting in last end of forest eagerly. I was with the expert Healer and having full faith on him.

After his repeated request I tried to chew some pieces of tuber. It was not good in taste but also not so bad. We were in forest in search of Medicinal Insects on Kalmi Trees that emerge only for few days in rainy season. The Healers of Gariaband region collect it during rainy season and use it round the year as medicine in powder form. If they miss the rainy season their formulations remain unused rest of the year. One of the purposes to visit with them was to collect the insects for laboratory so that studies on its life cycle can be done. At that time only Blumea Leaf Beetle and Trombidium were in my lab and there was much space for these insects.

"This Van Jagmandal Kanda is boon for your liver. Drink as much as alcohol without any fear of liver damage, one time use of this tuber will protect you up to many months." The Healer disclosed the secret fact about the wild tuber.

"Thanks, but I keep distance from alcohol and you can say me Teetotaler. Last year when I was consuming close relative of this wild tuber in forest the Healers stopped me by saying that you can get extra fat, please keep distance with it." I replied.

"It is different herb from the one you have taken at that time. If you are teetotaler then no problem. You can still take this tuber in small quantity. As I said earlier it is good for liver. You can say it promising Hepatoprotective Herb of rainy season." The Healer explained.

"Oh, thanks. In that case I can eat it in small quantity." I started chewing the tuber.

The alcohol is becoming real curse in modern India. Due to lack of willingness to keep alcohol away from youth the planners are not taking strong step. As result accidents, untimely deaths and social disturbances are becoming very common in the society. The published research papers claim much about anti-alcohol drugs that help in reducing the addiction. I have also documented valuable Traditional Medicinal Knowledge about it. During interactions with the Traditional Healers treating the cases of alcohol excess I observed that they use many herbs and Herbal Formulations that can help in preventing further damage of liver and also provide protection to liver from alcohol. I am taking special interest in such Formulations. I am sure that with the Traditional Healers in different parts of Globe lot of information on this aspect is available but unfortunately neither much work has been done nor important knowledge is documented on this aspect.

The Traditional Healers of Chhattisgarh Plains always mention Traditional and Medicinal Rice for liver health. Most of the Medicinal Rice from their top 100 list are now not under cultivation. Some of these Medicinal Rice are under cultivation in remote areas. Many Traditional Healers are also growing it but they are in very limited number. The efforts have been made by planners to replace the Traditional Rice by Modern but efforts to protect Traditional Rice were not done. As result the knowledge related to Traditional and Medicinal Rice is going waste.

The Traditional Healers of Bastar talk about Jhiya Rice. It is Traditional Rice as per official record but the Traditional Healers consider it as Medicinal Rice. They recommend its use in many diseases. Rice plant parts are also added in number of Formulations. To the patients with excessive consumption of alcohol they suggest regular use of cooked Jhiya rice with many herbs. The cooked Jhiya Rice is served on leaf platters and then selected Herbs are mixed with it. After few minutes patients are suggested to consume it.

The Traditional Healers of Orissa are also aware of it. Many of them visit to Bastar for this special Rice. The Healers of Niyamgiri Hill region use wild Rice growing in wasteland near rice fields for this purpose. In Chhattisgarh Plains it is known as Pas-har Rice. It is consumed only one day in

entire year i.e. during Khamarchhat Festival by common people. The Healers suggest its use round the year as per need. The Traditional Healers of Jharkhand also name number of Medicinal Rice but unfortunately these Rice are not available with them.

In Asian countries specially in India Paan (Piper betle leaves) is popular among common people. The Traditional Healers of Central India suggest the patients with liver related troubles to consume Kapri and Bangla types of Paan in alternate days. They claim that the use of these two Paan helps the patients to recover fast. Many Healers provide leaves from their own stock. They have reason for it.



(Indian Paan- Picture by Pankaj Oudhia)

"Earlier not much pesticides were in use in commercial cultivation of Paan but now due to heavy demand of fresh undamaged Paan leaves farmers have no way to protect the crop with the help of pesticides. They ignore the recommendations of scientists because the recommendations fail to save the crop. The Farmers mix different pesticides and apply it on Paan crop. As result they get pest free crop but Paan leaves become toxic. The concept of "Organic Paan" is still not in the field. Organic Farming of Paan is possible. I have suggested number of herb based organic inputs to my Paan farmers. They tried and found it very useful. These herb based formulations were from my Traditional Agricultural Knowledge database. But majority of the farmers are still using chemical methods to manage pest. The Traditional Healers providing Paan leaves to their patients claim that they give Paan grown without chemicals. I am satisfied with their explanation.

The Traditional Healers of North Chhattisgarh add some Herbal mixture in Paan and then give it to the patients. "We use 5 types of Herbs, mostly roots in the mixture." The Traditional Healers of Koriya district informed. I tasted the Paan and noted that addition of mixtures made it bitter. Bitter Paan are not preferred by common people. I must appreciate the Traditional Healers of Jashpur. They add these five herbs but also add 4 additional herbs; two for aroma and remaining for sweetish taste. This Paan is very popular among their patients. They suggest the use of Paan with Herbal Mixture up to three months in order to remain free from harmful effects of alcohol round the year.

"In any quantity?" I asked without any delay. "Yes, in any quantity." There was confidence in the voice.

Young researchers of Uttarakhand when approached to me for new topic of research I shared this story with them. They took the project and hoping that they will provide modern scientific base to this Special Paan.

One of my friends from Kolkata is in process of taking patent on use of Indian Paan for Diabetes management. He invited me before submitting the application for patent. When I examined the content and process I told him clearly that Formulation is incomplete. It will not play any important role in Diabetes Management.

It was big shock for his team.

"For your academic records you can take this patent but you are not going to earn anything from it. May I know from where you have got this very good concept?" I asked.

"From the Traditional Healers of Central India." He replied.

"It seems that the Healers have shared the knowledge half-heartedly. "I guessed.

"Yes you are right. At first we interacted with the Healers in good mood but when they refused to say any thing about Formulation we visited with forest officers next time. Under pressure he told about few herbs. When we tried it our Laboratory we realized that something is missing because the Paan given by Healers was effective but Paan made by us was not effective. We returned back to the Healers again with Forest Officers. This time they said that they have some mental problem and due to it they are not able to remember the complete Formulations. We returned back and tried so many Diabetes herbs mentioned in reference literature with no result. "He surrendered.

I was happy to know the tactics adopted by the Healers. All Healers are not that clever and under pressure disclose every thing. In the said patent the name of Traditional Knowledge holders were not mentioned, even they were not aware of such patent based on their knowledge. My friend invested much in clinical trials and experimentation. The time, efforts and money everything gone waste.

The best method is to say the truth to Healers and keep transparency in all process. Keep the Healers in top in the list of inventors. There is nothing wrong in it. But most of the researchers follow the odd path these days.

"We know that you are aware of the secret ingredients. We can file a new application with your name as one of the inventors." They proposed.

"Sorry, I cannot help in this regard. But I must suggest you to visit to the Healers and adopt standard procedure." I said in hard words.

Among Traditional Knowledge researchers there in blind race of patents.

"You have done a remarkable work on Traditional Healing. We have seen your CV. Surprisingly there is no patent so far. Why it so?" The young researchers of Central University in Bilaspur, Chhattisgarh asked to me when I was there for guest lecture.

"Because I have just documented the Traditional Knowledge. It is not my knowledge then how I can make any patent on it? I put question against their question.

"But sir, our professors visit to forest, collect information from Healers and then publish papers in their name. Many of them conduct small experiments in laboratory and then file patents without any delay." They disclosed the universal truth.

"Whether they acknowledge the Healers in papers or include them in the list of inventors?" I asked.

"No sir." They replied.

"Then this is not less than academic fraud." I said.

The researchers gave no reaction. It seemed that they were aware of it. Their professors enjoying this interaction disappeared within no time.

For excess alcohol I am fond of the Trio of the Traditional Healers of Niyamgiri. They suggest three types of Traditional Pulses named as Kulthi, Lakhdi and Zillo. They claim that regular use of these pulses protects liver and other body parts from excess Alcohol.

"It is better to develop taste of these Pulses and include it in daily food." They suggest.

Although these Traditional Pulses are under cultivation and easily available in rural areas but this simple combination is new for many Traditional Healers. I shared this knowledge with many Healers after taking consent by the knowledge owner.

"You are free to spread the knowledge. You will gain much from other Healers when you share this promising Formulation." The Healers of Niyamgiri said with blessings. They are true. This simple formulation has given me a lot in return.

In the dictionary of modern Pulse experts all these Traditional Pulses are not present. There is no promotion scheme for large scale cultivation of these pulses. One of these Pulses is banned by modern experts as they claim that it can cause paralysis. In Central India common people are consuming this pulse since time immemorial without any bad effects. The researchers found the paralysis like symptoms in experimental animals so based on this finding they banned it for human beings. Millions have been wasted for banning and developing new toxin free verities of this pulse crop. The Farmers refused to adopt it and continued growing Traditional varieties. Our students and young researchers are still learning in their courses about socalled harms of this pulse.

In a local marriage ceremony I was interacting with the professor of Raipur Medical College over dinner. He informed that the said Traditional Pulse is very harmful but the Chhattisgarh farmers are fool enough as they are still cultivating and consuming it. I invited him to meet the team members engaged in preparing dinner. They disclosed that in most of the items as important ingredient as well as adulterant this Traditional Pulse is present. The food served to Professor was also having the said pulse in large amount enough to cause so-called paralysis. This disclosure made the professor shocked. I explained about the conspiracy behind this rumor and presented online articles on medicinal uses of this pulse and added "It is boon for your health and the most important thing is that it can protect you from excess alcohol." The professor was wordless. I was talking about Lathyrus.

Kulthi is popularly consumed in rural areas. In urban areas natives consume it as medicine when they suffer from Renal Calculi. It flushes the calculi out effectively. Kulthi is beneficial for many organs mainly Kidney. Kulthi growers cultivate it by Traditional and modern methods but Traditional Healers grow it by using Traditional Allelopathic Knowledge. They treat the plants with herbal solutions in order to enrich it with desired medicinal properties. I have documented this Traditional Allelopathic Knowledge in detail.



(Traditional Pulse from Niyamgiri Hills-Picture by Pankaj Oudhia)

Here is list of some medicinal plants from my database associated with keyword Liver and Alcohol excess.

Anemone hupehensis Lemoine ex Boynton var. japonica

Anemone rivularis Buch.- Ham.ex DC.

Aquilegia vulgaris L.

Clematis gouriana Roxb. ex DC.

Clematis munroiana Wight

Clematis smilacifolia Wall.

Clematis theobromina Dunn

Clematis wightiana Wall. ex Wight & Arn.

Consolida ambigua (L.) P. W. Ball

Delphinium elatum L.

Naravelia zeylanica (L.) DC.

Ranunculus diffusus DC.

Ranunculus muricatus L.

Ranunculus reniformis Wall. ex Wight & Arn.

Ranunculus wallichianus Wight & Arn.

Thalictrum foliolosum DC.

Thalictrum javanicum Blume

Thalictrum saniculaeforme DC.

Chimonanthus praecox(L.) Link

Acrotrema arnottianum Wight

Dillenia bracteata Wight

Dillenia indica L.

Dillenia pentagyna Roxb.

Dillenia retusa Thunb.

Dillenia suffruticosa (Griffith) Martelli

Tetracera akara (Burm. f.) Merr.

Magnolia campbellii Hook. f. & Thoms.

Magnolia grandiflora L.

Magnolia liliflora Desr.

Magnolia x alba DC.

Michelia champaca L.

Michelia nilagirica Zenk.

Alphonsea lutea (Roxb.) Hook. f. & Thoms.

Alphonsea sclerocarpa Thw.

Alphonsea zeylanica Hook. f. & Thoms.

Annona cherimola Mill.

Annona muricata L.

Annona reticulata L.

Annona squamosa L.

Artabotrys hexapetalus (L. f.) Bhandari

Artabotrys zeylanicus Hook. f. & Thoms.

Cananga odorata (Lam.) Hook. f. & Thoms.

Cyathocalyx zeylanicus Champ. ex Hook. f. & Thoms.

Desmos lawii (Hook. f. & Thoms.) Safford

Desmos viridiflorus (Bedd.) Safford

Goniothalamus cardiopetalus (Dalz.) Hook. f. & Thoms.

Goniothalamus rhynchantherus Dunn

Goniothalamus salicina Hook. f. & Thoms.

Goniothalamus thwaitesii Hook. f. & Thoms.

Goniothalamus wightii Hook. f. & Thoms.

Goniothalamus wynadensis (Bedd.) Bedd.

Meiogyne pannosa (Dalz.) Sinclair

Meiogyne ramarowii (Dunn) Gandhi

Miliusa eriocarpa Dunn

Miliusa montana Gard. ex Hook. f. & Thoms.

Miliusa nilagirica Bedd.

Miliusa tomentosa (Roxb.) Sinclair

Miliusa wightiana Hook. f. & Thoms.

Mitrephora heyneana (Hook. f. & Thoms.) Thw.

Orophea erythrocarpa Bedd.

Orophea thomsonii Bedd.

Orophea uniflora Hook. f. & Thoms.

Polyalthia cerasoides (Roxb.) Bedd.

Polyalthia coffeoides (Hook. f. & Thoms.) Benth. & Hook. f. ex Hook. f. & Thoms.

Polyalthia fragrans (Diaz.) Bedd.

Polyalthia korintii (Dunal) Thw.

Polyalthia longifolia (Sonner.) Thw.

Polyalthia rufescens Hook. f. & Thoms.

Polyalthia suberosa (Roxb.) Thw.

Polyalthia tirunelveliensis M. B. Viswan. & Manikandan

Popowia beddomeana Hook. f. & Thoms.

Sageraea dalzellii Bedd.

Uvaria macropoda Hook. f. & Thoms.

Uvaria narum (Dunnal) Wall. ex Wight & Arn.

Uvaria zeylanica L.

Xylopia parvifolia (Wight) Hook. f. & Thoms.

Anamirta cocculus (L.) Wight & Arn.

Cissampelos pareira L. var. hirsuta (Buch.-Ham. ex DC.) Forman

Cocculus hirsutus (L.) Diels

Cocculus laurifolius DC.

Cocculus pendulus (Forst.) Diels

Coscinium fenestratum (Gaertn.) Coleb.

Cyclea arnottii Miers

Cyclea peltata (Lam.) Hook. f. & Thoms.

Diploclisia glaucescens (Blume) Diels

Pachygone ovata (Poir.) Miers ex Hook. f. & Thoms.

Stephania japonica (Thunb.) Miers

Stephania wightii (Arn.) Dunn

Tiliacora acuminata (Lam.) Hook. f. & Thoms.

Tinospora cordifolia (Willd.) Miers ex Hook. f. & Thoms.

Tinospora sinensis (Lour.) Merr.

Berberis lycium Royle

Berberis nilghiriensis Ahrendt

Berberis tinctoria Lesch. Berberis wightiana Schneid Mahonia leschenaultii (Wall. ex Wight & Arn.) Takeda Nelumbo nucifera Gaertn. Nymphaea nouchali Burm. f. Nymphaea pubescens Willd. Nymphaea rubra Roxb. ex Salisb. Argemone mexicana L. Eschscholzia californica Cham. Mecanopsis wallichii Hook. Papaver caucasicum Bait. Papaver fugax Poir. Papaver rhoeas L. Papaver somniferum L. Romneya coulteri Harv. Corydalis lutea (L.) DC. Dicentra scandens (D. Don.) Walp. Fumaria indica (Hassk.) Pugsley Fumaria officinalis L.

Barbarea intermedia Boreau

Barbarea verna (Miller) Asch.

Barbarea vulgaris R. Br.

Brassica juncea (L.) Czern. & Coss.

Brassica nigra (L.) Koch

Brassica oleracea L. var. botrytis L.

Brassica oleracea L. var. capitata L.

Brassica oleracea L. var. gemmifera Zenk.

Brassica oleracea L. var. gongylodes L.

Brassica rapa L.

Capsella bursa-pastoris (L.) Medicus

Cardamine africana L.

Cardamine hirsuta L.

Cardamine trichocarpa Hochst. ex A. Rich.

Cheiranthus cheiri L.

Coronopus didymus (L.) Sm.

Iberis amara L.

Iberis umbellata L.

Lepidium ruderale L.

Lepidium sativum L.

Lepidium virginicum L.

Lobularia maritima (L.) Desv.

Matthiola incana (L.) R. Br.

Raphanus sativus L.

Rorippa indica (L.) Hiern

5/2/2021 Rorippa nasturtium - aquaticum (L.) Hayek Sisymbrium volgense Ledeb. ex Shmal. Thlaspi arvense L. Cadaba fruticosa (L.) Druce Cadaba trifoliata (Roxb.) Wight & Arn. Capparis brevispina DC. Capparis decidua (Forsk.) Edgew Capparis divaricata Lam. Capparis diversifolia Wight & Arn. Capparis fusifera Dunn Capparis grandiflora Wall ex. Hook.f. & Thoms. Capparis grandis L. Capparis kollimalayana Viswanathan Capparis moonii Wight Capparis nilgiriensis Subbha Rao, Kumari & Chandr. Capparis rheedii DC. Capparis rotundifolia Rottl. Capparis roxburghii DC. Capparis sepiaria L.

Capparis shevaroyensis Sundararaghavan

Capparis spinosa L.

Capparis zeylanica L.

5/2/2021 Cleome angustifolia Forsk Cleome aspera Koen ex. DC. Cleome burmannii Wight & Arn. Cleome chelidonii L. Cleome felina L. Cleome hassleriana Chod. Cleome monophylla L. Cleome rutidosperma DC. Cleome speciosa Raf. Cleome viscosa L. Crateva adansonii DC. subsp. odora (Buch. - Ham.) Jacobs Crateva magna (Lour.) DC. Gynandropsis gynandra (L.) Briq Maerua apetala (Roth) Jacobs Maerua oblongifolia (Forsk.) A. Rich Steriphoma clemoides Spreng. Reseda alba L. Reseda luteola L. Hybanthus enneaspermus (L.) F. v. Muell. Hybanthus travancoricus (Bedd.) Melch.

Viola arcuata Blume

Viola betonicifolia J. E. Smith subsp. betonicifolia

Viola canescens Wall. ex Roxb.

Viola hamiltoniana D. Don

Viola pilosa Blume

Viola x wittrockiana Gams

Bixa orellana L.

Cochlospermum religiosum (L.) Alston

Aphloia theiformis (Vahl) Benn.

Casearia championii Thwaites

Casearia graveolens Dalz.

Casearia ovata (Lam.) Willd.

Casearia rubescens Dalz.

Casearia thwaitesii Briq.

Casearia tomentosa Roxb.

Casearia wynadensis Bedd.

Flacourtia indica (Burm.f.) Merr.

Flacourtia jangomas (Lour.) Raeusch.

Flacourtia montana Graham

Homalium jainii A. N. Henry & Swamin.

Homalium travancoricum Bedd.

Homalium ceylanicum (Gard.) Benth.

Hydnocarpus alpina Wight

Hydnocarpus macrocarpa (Bedd.) Warb.

Hydnocarpus pentandra (Buch. - Ham.) Oken

Oncoba spinosa Forsk.

Scolopia crenata (Wight & Arn.) Clos var. crenata

Scolopia crenata (Wright & Arn.) Clos var. brevifolia Mukherjee

Xylosma latifolium Hoof. F. & Thoms.

Xylosma longifolia Clos

Hymenosporum flavum (Hook.) F.v. Muell.

Pittosporum anamallayense Nayar & Giri

Pittosporum bicolor Hook.

Pittosporum ceylanicum Wight

Pittosporum crassifolium Soland.ex Putterl.

Pittosporum dasycaulon Miq.

Pittosporum eugenioides A. Cunn.

Pittosporum napaulense (DC.) Rehder & Wilson

Pittosporum neelgherrense Wight & Arn.

Pittosporum tetraspermum Wight & Arn.

Pittosporum tobira (Thunb.) Ait.

Pittosporum umbellatum Gaertn.

Pittosporum undulatum Vent

Pittosporum viridulum Nayar, Giri & Chandrasekaran

Sollya heterophylla Lindl.

Muraltia juniperifolia DC.

Polygala arillata Buch.-Ham. ex D. Don

Polygala arvensis Willd.

Polygala bolbothrix Dunn

Polygala chinensis L.

Polygala elongata Klein ex Willd.

Polygala erioptera DC.

Polygala jacobii Chandrabose

Polygala javana DC.

Polygala longifolia Poir.

Polygala myrtifolia L.

Polygala persicariifolia DC.

Polygala rosmarinifolia Wight & Arn.

Polygala sibirica L.

Polygala telephioides Willd.

Polygala virgata Thunb.

Polygala wightiana Wall. ex Wight & Arn.

Securidaca bracteata Bennett

Xanthophyllum flavescens Roxb.

Xanthophyllum manickamii Murugan

Arenaria neelgerrensis Wight & Arn.

Cerastium glomeratum Thuill.

Cerastium indicum Wight & Arn.

Dianthus caryophyllus L.

Drymaria cordata (L.) Willd. ex Roem. & Schultes subsp. diandra (Blume) Duke

Drymaria villosa Cham. & Schlect.

Gypsophila elegans M. Bieb.

Lychnis coronaria (L.) Desr.

Polycarpaea aurea Wight & Arn.

Polycarpaea corymbosa (L.) Lam. var. corymbosa

Polycarpaea corymbosa (L.) Lam. var. longipetala Sriniv. & D. Naras.

Polycarpaea diffusa Wight & Arn.

Polycarpaea spicata Wight & Arn.

Polycarpon prostratum (Forsk.) Asch. & Sehweinf.

Polycarpon tetraphyllum (L.) L.

Sagina saginoides (L.) Karsten, Deutsch

Saponaria officinalis L.

Scleranthus annus L.

Silene armeria L.

Silene coeli - rosa (L.) Godron

Silene gallica L.

Spergula arvensis L.

Stellaria media (L.) Vill.

Stellaria monosperma Buch. - Ham. ex D. Don var. paniculata (Edgew) Majumdar

Stellaria vestita Kurz

Vaccaria pyramidata Medicus

Portulaca oleracea L. var. oleracea

Portulaca oleracea L. var. linearifolia Sivarajan & Manilal

Portulaca pilosa L. subsp. pilosa

Portulaca pilosa L. subsp. pilosa var. tuberosa (Roxb.) Sivar.

Portulaca pilosa subsp. grandiflora (Hook.f.) Geesink

Portulaca quadrifida L.

Portulaca wightiana Wall ex Wight & Arn.

Portulacaria afra Jacq.

Talinum portulacifolium (Forsk.) Asch. & Schweinf.

Talinum triangulare Willd.

Tamarix aphylla (L.) Karsten

Tamarix ericoides Rottl.

Tamarix indica Willd.

Bergia ammannioides Roxb.

Bergia capensis L.

Elatine ambigua Wight

Elatine triandra Schkuhr

Calophyllum apetalum Willd.

Calophyllum austroindicum Kosterm.

Calophyllum inophyllum L.

Calophyllum polyanthum Wall.ex Choisy

Garcinia cowa Roxb. ex DC

Garcinia gummi-gutta (L.) Robs.

Garcinia mangostana L.

Garcinia morella (Gaertn.) Desr.

Garcinia papilla Wight

Garcinia rubro-echinata Kosterm.

Garcinia spicata (Wight & Arn.) Hook.

Garcinia talbotii Raiz. ex Sant

Garcinia travancorica Bedd.

Garcinia wightii T. And.

Garcinia xanthochymus Hook. f. ex. T. And.

Hypericum androsaemum L.

Hypericum humifusum L.

Hypericum japonicum Thunb. ex Murr.

Hypericum mysurense Heyne ex Wight & Arn.

Hypericum patulum Thunb ex Murray

Hypericum uralum Buch. - Ham. ex D. Don

Hypericum wightianum Wall. ex Wight & Arn.

Mammea suriga (Buch. - Ham. ex Roxb.) Kosterm.

Mesua ferrea L. subsp. ferrea

Mesua ferrea L. subsp. pulchella (Planch. & Triana) Vesque var. pulchella

Mesua ferrea L. subsp. pulchella (Planch. & Triana) Vesque var. coromandeliana (Wight) Mahesh.

Poeciloneuron indicum Bedd.

Poeciloneuron pauciflorum Bedd.

Camellia japonica L.

Camellia sinensis (L.) Kuntze

Eurya nitida Korth

Gordonia obtusa Wall ex Wight Arn.

Schima wallichii (DC.) Korth

Ternstroemia japonica (Thunb.) Thunb.

Saurauia fasciculata Wall.

Saurauia napaulensis DC.

Stachyurus himalaicus Hook. f. & Thoms. ex Benth.

Dipterocarpus indicus Bedd.

Hopea erosa (Bedd.) van Sloot.

Hopea glabra Wight & Arn.

Hopea parviflora Bedd.

Hopea ponga (Dennst.) Mabberley

Hopea utilis (Bedd.) Bole

Shorea roxburghii G. Don.

Vateria indica L.

Ancistrocladus heyneanus Wall. ex Graham

Abelmoschus angulosus Wall ex Wight & Arn.

Abelmoschus esculentus (L.) Moench

Abelmoschus ficulneus (L.) Wight & Arn.

Abelmoschus manihot (L.) Medicus

Abelmoschus moschatus Medicus subsp. tuberosus (Span.) Borss. Waalk

Abutilon crispum (L.) Medicus

Abutilon hirtum (Lam.) Sweet

Abutilon indicum (L.) Sweet subsp. indicum

Abutilon indicum (L.) Sweet subsp. guineense (Schumach.) Borssum

Abutilon megapotamicum (Spreng.) Mill. & Naud.

Abutilon neilgherrense Munro ex Wight

Abutilon pannosum (Forst. f.) Schlect

Abutilon persicum (Burm. F.) Merr.

Abutilon ramosum (Cav.) Guill. & Perr.

Abutilon striatum Dickson ex Lindl.

Abutilon theophrastii Medicus

Alcea rosea L.

Decaschistia crotonifolia Wight & Arn.

Decaschistia rufa Craib

Gossypium arboreum L.

Gossypium barbadense L.

Gossypium herbaceum L.

Gossypium hirsutum L.

Hibiscus canescens Heyne ex Wight & Arn.

5/2/2021 Hibiscus cannabinus L. Hibiscus furcatus Willd. Hibiscus hirtus L. Hibiscus lobatus (Murr.) Kuntze Hibiscus lunariifolius Willd. Hibiscus mutabilis L. Hibiscus micranthus L.f. Hibiscus panduriformis Burm. Hibiscus platanifolius (Willd.) Sweet Hibiscus radiatus Cav. Hibiscus rosa-sinensis L. Hibiscus sabdariffa L. Hibiscus schizopetalus (Mast.) Hook. Hibiscus surattensis L. Hibiscus syriacus L. Hibiscus tiliaceus L. Hibiscus trionum L. Hibiscus vitifolius L. Kydia calycina Roxb. Malachra capitata (L.) L. Malva parviflora L.

Malva sylvestris L.

Malva verticillata L.

Malvastrum coromandelianum (L.) Garcke

Malvaviscus arboreus Cav. var. arboreus

Malvaviscus arboreus Dill ex Cav. var. penduliflorus (DC.) Schery

Modiola caroliniana (L.) G. Don

Pavonia odorata Willd.

Pavonia procumbens (Wall ex. Wight & Arn.) Walp.

Pavonia zeylanica (L.) Cav.

Plagianthus pulchellus A. Gray

Sida acuta Burm.f.

Sida cordata (Burm. f.) Borssum

Sida cordifolia L.

Sida mysorensisWight & Arn.

Sida rhombifolia L. var. rhombifolia

Sida rhombifolia L. var. retusa (L.) Borss.

Sida schimperiana Hochst.

Sida spinosa L.

Thespesia lampas (Cav.) Dalz. ex Dalz. & Gibs

Thespesia populnea (L.) Soland ex Correa

And many more

(contd.)

Views: 1854

Share Tweet Facebook

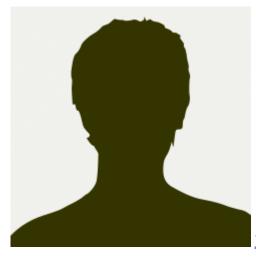
- < Previous Post
- Next Post >

Add a Comment

You need to be a member of Research and Media Network to add comments!

Join Research and Media Network

About



Matthew Wright created this Ning Network.

Welcome to Research and Media Network

Sign Up or Sign In

© 2021 Created by Matthew Wright. Powered by

Badges | Report an Issue | Terms of Service